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Purpose of and Need for the Proposed Action

Background

The Bureau of Land Management (BLM) is charged with controlling and accommodating public use at Cove Recreation Site. BLM's 1997 Strategic Plan listed as one of its four principal actions the need to, "Serve current and future public...[by] provid[ing] opportunities for environmentally responsible recreation." The Plan further states, "Well designed, universally accessible facilities, combined with sound management techniques can stabilize and restore natural values, increase safety and improve the recreation experience."

Purpose

The purpose of the proposed action is to redevelop the Cove Recreation Site within the BLM Owyhee Field Office, Owyhee County, Idaho, to accommodate a diversity of recreational opportunities within the roaded natural settings along the shoreline of C.J. Strike Reservoir (Figure 1).

Need

This project is needed to replace aging and degraded facilities at the Cove Recreation Site used for water-based and land-based recreational activities, as well as to ensure visitor health and safety in an environmentally sensitive fashion. The redevelopment would serve to:

- **Meet the needs of the growing numbers of C.J. Strike Reservoir recreationists.** The project reflects the need for expanded facilities to meet the demands of a significantly larger regional population than was present in 1965/66 when the site was originally designed and constructed by the U.S. Job Corps. The combined population of the four counties closest to C.J. Strike Reservoir (Ada, Canyon, Elmore, and Owyhee) exceeded 470,000 in 2000 and increased by 46, 46, 37, and 27 percent, respectively, from 1990 to 2000 (U.S. Census Bureau 2002). The reservoir is within easy driving distance of the largest concentration of population in Idaho (the cities of Boise, Meridian, Nampa, and Caldwell) as well as the expanding city of Mountain Home, and is one of the ten most-visited bodies of water by recreationists in the State (Idaho Statesman 1996).

Observation and recorded use at Cove Recreation Site by a BLM volunteer Camp Host in 1995 estimated more than 1,200 persons used the site on Memorial Day weekend that year (Registration forms on file, Boise District BLM). The site is designed to accommodate no more than 150 people at a time. On that weekend, campers occupied all of the 25 campsites, every open area on the reservoir shoreline within the site and also spilled out onto the undeveloped sagebrush lands surrounding the developed area. A similar situation was observed on Labor Day weekend of that same year. Though these two days do not represent average use at the site, Camp Host observations during the active use season (Memorial Day through Labor Day) support the notion that the demand for facilities at Cove

Figure 1 Project Location Map with Recreation Resources at C.J. Strike Reservoir

Environmental Assessment for Reconstruction of Cove Recreation Site

Recreation Site is rarely met, particularly on weekends. Anecdotal observations from earlier years when there was no camp host suggest that overcrowding and unmet recreational needs are not a new occurrence at this site.

- **Provide safe recreation facilities and public access to the reservoir.** The project is needed to facilitate an improved management of the site, providing a better recreational experience for the public and reducing vandalism and neglect. Because of infrequent corrective maintenance actions and the long-term effect of constant sun and wind, most of the facilities at the site have deteriorated over the years. Use has grown despite the deterioration of the day-use structures and the surrounding environment.
- **Reduce adverse impacts to the recreation site and to the general ecological conditions of the surrounding environment.** The impacts to soil, water quality, vegetation, and public health as a result of unmanaged use of this site are a concern. For example, the ground surface surrounding the structures is partially denuded of vegetation and highly compacted as a result of overuse and unrestricted vehicle traffic.

Alternatives

The following alternatives were developed as part of this environmental assessment (EA) and are analyzed below:

- P Proposed Action Alternative
- P No Action Alternative
- P Intermediate Action Alternative

Proposed Action Alternative – Reconstruction of Cove Recreation Site

Under the Proposed Action Alternative, existing facilities would be replaced and updated while additional facilities would be added (Figure 2). Categories for renovation would include new and reconstructed/rehabilitated facilities. A new fee structure for use of the site would be implemented to allow for maintenance of the upgraded facilities.

Rehabilitation of some areas affected by off road vehicles (ORVs) on the east side of the Cove Inlet (Figure 3) would occur along with recontouring on the west side of Cove Inlet to reduce erosion impacts. Barriers would be installed to control vehicle traffic.

A new, larger pump house would be constructed to replace the existing pump house. The current water lines are small and deteriorating and may be replaced with larger potable/irrigation lines throughout the site in conjunction with construction of the new pump house. Additional water lines may also be constructed.

Plans for shoreline stabilization on the north shore of the recreation site would be implemented to reduce erosion in that area (Figure 4). Shoreline stabilization would entail new construction along the north shoreline and the west side of the Cove Inlet. Heavy equipment would be used for excavation and backfilling. The following three features are proposed.

- A Welded Wire Wall (WW Wall) would be constructed on the west end of the north shoreline to reduce erosion in that area. Filter fabric would be installed and a rock face would be constructed inside the WW Wall where vertical sections are visible to prohibit movement of soil. A 3:1 slope would be created. The anticipated disturbance for this feature would be 23 feet plus or minus 6 feet to the north and 6 feet to the south, for a maximum potential disturbance of 35 feet. The WW Wall would be approximately 100 feet in length.
- East of the WW Wall, riprap would be installed. Filter fabric would be used with rocks on top to prohibit soil from moving through. This area may be designed to slope back toward the recreation area. The anticipated disturbance for this feature would be 8 feet plus or minus 6 feet to the north and 6 feet to the south, for a maximum potential disturbance of 20 feet. The riprap area would be approximately 300 feet in length.

Figure 2. Proposed Action. West Side of Cove Inlet.

Figure 3. Proposed Action. East Side of Cove Inlet.

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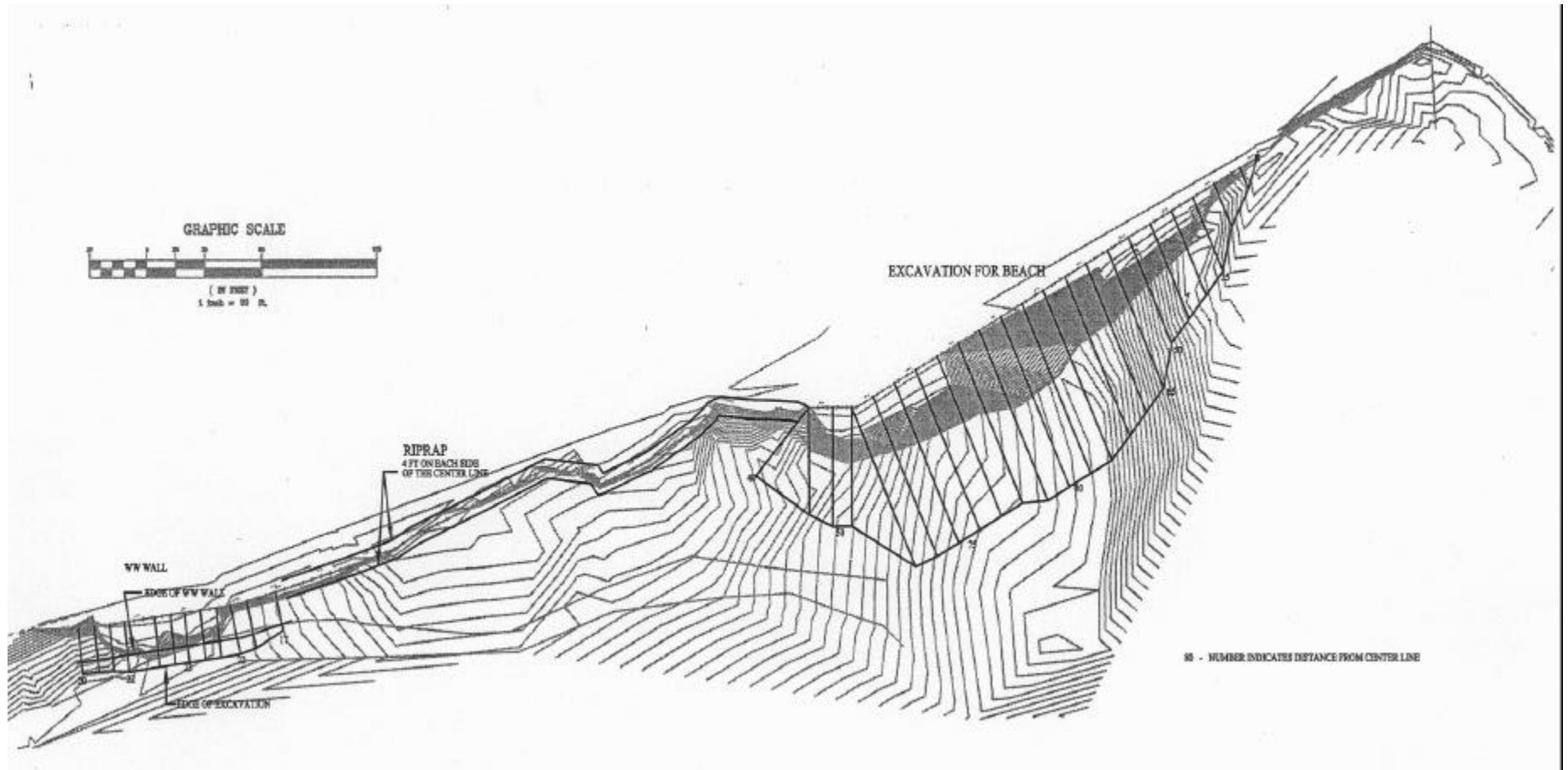


Figure 4. Shoreline Stabilization. Proposed, Intermediate, and No Action Alternatives.

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- East of the area where riprap would be installed and closer to the Cove Inlet, excavation for a beach would take place. A 3:1 slope would be created in place of the vertical cliff that is currently there. The gradual slope that would be created at the water's edge would help to reduce erosion in this area. Construction of this feature would result in the greatest amount of disturbance associated with the stabilization of the north shoreline. The anticipated disturbance for this feature would be 80 feet plus or minus 6 feet to the north and 6 feet to the south, for a maximum potential disturbance of 92 feet. The beach excavation area would be approximately 260 feet in length.

New Facilities

1. A new dual unit campground host site would be added at the recreation area. At the host site a concrete pad; electric, water, and recreational vehicle (RV) sewer hookups; and a shade and screening structure to protect against the sun and wind would be installed. The RV sewer hookup would either be connected to a fully contained septic vault, which would require regular pumping, or to a septic drain system. The host site would be located such that the host would have visual control over access into the recreation complex.

2. Camping areas would be added at the site including individual units, group units, and an overnight rest area. Five new designated camping loops would be developed.

- P Cove Inlet Camping Loop - 6 units
- P Cove Point Camping Loop – 13 units
- P Upper Group Camping Loop – 7 units
- P Lower Group Camping Loop – 7 units
- P Round Camping Loop – 5 units

All camp units/sites would be developed to meet BLM fee standards. A unit numbered marker, hardened picnic pad (with table, fire-ring and grill, and shade structure [Appendix A. Drawings of Typical Structures]) and vegetative screening around the units supported with drip irrigation would be developed at all of the camping areas. All single unit vault restrooms would contain 1,000-2,000 gallon vaults and would be handicapped accessible where possible.

The Cove Inlet Camping Loop would include six RV back-in camp units. Each unit would have a 20-30 foot (6.1-9.1 m), level and graveled parking pad. Three to four water spigots and two to three single unit vault restrooms would be strategically located. The Cove Inlet Road would be a 16-foot (4.9 m) wide one-way, all season graveled roadway.

The Cove Point Camping Loop would include 13 RV camp units (back-in, pull-out, and pull-through). Each unit would have a 30-60 foot (9.1-18.3 m), level and graveled parking pad. Four to six water spigots and three to four single unit vault restrooms would be strategically located. The Cove Point Loop Road would be a 20-foot (7.6 m) wide two-way, all-season gravel road.

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The Upper Group Camping Loop would include seven RV camp units (back-in and pull-through). Each unit would have a 30-60 foot (9.1-18.3 m), level and graveled parking pad. Two to three water spigots and one to two single unit vault restrooms would be strategically located. The Upper Group Camping Road would be a one-way, 16-foot (4.9 m) wide, all-season gravel road.

The Lower Group Camping Loop would include seven RV camp units (back-in and pull through). Each unit would have a 30-60 foot (9.1-18.3 m), level and graveled pad. Two to three water spigots and one to two single unit vault restrooms would be strategically located. The Lower Group Camping Road would be a 16-foot (4.9 m) wide one-way, all-season gravel road.

The Round Camping Loop would include five RV camp units (with circle parking around a central common use area) and would be designated as an overnight rest area. Each space would accommodate RVs on a 60-foot (18.3 m) level and graveled parking space. This site would contain one large hardened picnic pad with room for two large picnic tables, a fire-ring and grill, and a shade structure. Vegetative screening would be developed around the perimeter and inside the camp circle. Two water spigots and one double unit vault restroom would be strategically located. The access into the loop would be a one-way, all-season gravel road.

3. A single unit RV dump station would be developed near the access roads into the recreation site. The station would have lanes on each side to allow for dumping of RV wastes when entering or exiting the facility.

4. One BLM entry sign would be installed along with one Camp Registration Kiosk and one smaller Day Use Kiosk (at the trail parking area). Fee stations would be located appropriately. Three major Interpretative/Informational Kiosks would be developed at the Buford, Cove Point, and Trailhead areas. Appropriate thematic interpretative information, area rules and regulations, and an area map would be posted.

5. Eleven fully accessible fishing docks would be placed in the Cove Inlet. The upper six (on the north side and closest to the reservoir) would be open to both fishing and boat docking (along one side), while the lower five (further south and closer to the existing pump station near Cove Inlet) would be used for fishing only.

Reconstructed/Rehabilitated Facilities

1. Two areas would be developed as designated day use areas.

P Cove Point Day Use Area would be redeveloped primarily to support the more passive type day use activities such as fishing, picnicking, and relaxation. The area would include several individual picnic and group picnic sites with picnic pads, shade and wind protection through vegetation and structures, tables, fire-rings/grills, water, double vault restrooms with gray water drains, fishing bank/dock access, a walking trail, and benches (Appendix A). One common

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parking area would be developed to support the area. The site would be hardened for full accessibility for handicapped users including access to the trail.

- P** Buford Day Use Area (named after the Camp Buford site on the Oregon Trail, located near the shore on the northwest portion of the recreation site) would be redeveloped to support the more active type day use activities that are often sought by the younger age groups and young families, such as beach and swimming opportunities, sun bathing, gaming areas, and individual and group picnic units. Expansion of additional day use facilities to the immediate west of the existing boat ramp (between the ramp and the westerly pump station, nearer to Black Sands Resort) would be provided for in the Recreation Project Plan for Cove Recreation Site and implemented as demand requires, most likely before the year 2007. Facilities similar to Cove Point Day Use Area would be developed at this site.

2. All trails from Buford Day Use Area to Cove Inlet Loop would be fully hardened and accessible after construction. Several of the ORV-created trail segments that exist on the east side of Cove Inlet (to the Bruneau Narrows) would be rehabilitated to natural conditions and other segments would be reconstructed for non-motorized use. Trail access parking would be provided at Cove Inlet. ORV use would be redirected at the entrance to other existing routes providing access to the Narrows. A horse staging area would be located along the entrance road between State Highway 78 (SH-78) and the recreation site. This area would access existing roads and trails to the Narrows and the east Cove Inlet trails.

3. The existing boat ramp and adjacent shoreline near the Buford Day Use Area would be maintained for car top boats and provisions would be made for beaching of boats. Parking would be provided for vehicles launching boats and adequate barriers would be installed to protect designated areas from human disturbance.

4. The access and interior road system would be reestablished, modified, or rerouted to provide for effective vehicular management within the recreation site. The existing road from Buford Day Use Area to Black Sands Resort, west of the site, would be closed to general vehicular travel. Barriers would be installed throughout the site to keep vehicle traffic on designated routes and use areas. Modification of routes (non-designated roads, trails, and ways) accessing the Bruneau Narrows from Cove Recreation Site would be done in coordination with the development of the Resource Management Plan for the Snake River Birds of Prey National Conservation Area (NCA).

Plan Concept: Facilities and Design Parameters

Redevelopment would occur in three phases (Figures 2 and 3):

1. Phase One of the project would include the following:

- P** Installation of the host unit; new pumphouse/storage building (with additional water tanks); Cove Inlet, Cove Point Loop, and Lower Group camping units; Cove Point and Buford Day Use Areas (including

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associated facilities); RV Dump; Cove Inlet Trail and parking; major signage and kiosks; and fee stations and supporting services (water spigots, restrooms, and gray water drains)

- P Stabilization of the C.J. Strike Reservoir shoreline
- P Realignment of access and interior roads
- P Repair/Replacement of existing docks and addition of new docks
- P Round Loop camping areas would also be graded and perimeter barriers would be placed to allow for camping overflow while preventing vehicles from overflowing onto surrounding areas
- P Vegetative planting and associated drip irrigation
- P Rehabilitation of disturbed areas.

2. Phase Two of the project would include the following:

- P Completion of development of the Round Loop and Upper Loop group camping units (including associated facilities)
- P Extension of the shoreline trail to Buford Day Use Area
- P Rehabilitation of roads and trails on the east side of Cove Inlet
- P Creation of parking and staging areas for horses and pedestrian use (between Cove Recreation Site and SH-78)
- P Placement of additional shade structures at Buford, if needed, and additional signing
- P Vegetative planting and associated drip irrigation
- P Rehabilitation of disturbed areas.

3. Phase Three of the project would include the following:

- P Expansion of the Buford Day Use Area to the west
- P Completion of the trail network
- P Rehabilitation on the east side of Cove Inlet.

Assumptions, Site Limitations, and Problems

1. The site would be designed to provide recreationists with a safe, clean, and functional site that would, where possible, emphasize simple technology over complex technology and low maintenance facilities over high maintenance facilities.

2. Because of the difficulty of securing funding to maintain recreational facilities, a major portion of the redeveloped site would be operated on a fee-for-use basis, with all of the fees returned to the site for maintenance. Because the site is within the NCA, fees at Cove Recreation Site can be charged even if the current fee programs are eliminated.

3. The site would be designed for year-round use, but the highest use period is expected to be in the spring and summer with use gradually decreasing in the fall.

4. The largest numbers of users would continue to be day users, but demand for overnight camping facilities would continue to increase.

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5. Funding for this project would be phased to take advantage of various state grant programs, Federal Energy Regulatory Commission (FERC) re-licensing mitigation, and federal funds for deferred maintenance projects.
6. New docks, rehabilitated day use areas, camp sites, a new pump house and associated water lines, establishment of designated routes and trails, shoreline stabilization, and a full-hookup host unit are the highest development priorities and are proposed in the first phase of the redevelopment.
7. The existing boat ramp is continually being silted in as a result of its location relative to the prevailing winds and waves. As such, it would not be retained as a major boat launch facility, but would instead be maintained only for the launching of car top boats. The existing boat ramps at Black Sands Resort, Idaho Fish & Game Department's Cottonwood Site, and the Mountain Home Air Force Base's Recreation Park, have adequate service and are close enough to provide for the boat launching needs of the recreationists using Cove Recreation Site (Figure 1).
8. Day use and camping facilities would be separate at the site. Camping facilities would accommodate both RV and tent campers, but RV units would not include full hookups.
9. The location of some camping facilities away from the shoreline of the reservoir would require the establishment of shade trees in the camp area for shade, and shrubs and ground cover for screening. Shade structures would also be placed at a majority of the camp units.
10. Construction of new permanent vault restrooms at the day use areas and the overnight and long-term camping areas are necessary to accommodate increased use and ensure accessibility for handicapped users.
11. The main goal of vegetative planting is to provide screening and shade to the facilities in both the day use and camping areas. A mixture of shrubs, trees, and groundcover plants would be used to achieve these goals. Where possible, drought-tolerant native species adapted to the site would be used. Where native species are unavailable, too expensive, or impractical, equally hardy, non-invasive, non-native plants would be used. A low-volume drip irrigation system would be used to both establish and maintain the plantings.
12. Hunting would be prohibited in the recreation area.
13. No special provisions would be made for ORV use. Trails would be developed for pedestrian, equestrian, and mountain bike use.

Additional Protective Measures

The Proposed Action Alternative would include the following measures to minimize potential impacts to the resources:

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- P Revegetation of disturbed areas with desirable species would occur as soon as practicable after disturbance, taking into consideration natural moisture patterns, to prevent the spread of undesirable species such as noxious weeds
- P Roads and day use/camp areas would be recontoured where necessary to reduce erosion
- P Shoreline stabilization would take place on the west side of the Cove Inlet and north shore where C.J. Strike Reservoir is immediately adjacent to the site.

No Action Alternative

Under the No Action Alternative (Figures 5 and 6), conditions at Cove Recreation Site would remain the same, with minimal maintenance occurring to the existing facilities (Figures 7 and 8). Currently, 25 designated use sites exist at the Cove. Each site has a parking area, shade structure, fire-ring, and table (Figures 9 and 10). Although apparently designed as day use picnic areas, the public now heavily uses the 25 units as multi-day campsites. Several of the sites are immediately adjacent to a floating dock that is supposed to be for common use, but instead is treated as part of a private campsite. Although no improvements would be made to the facilities, the shoreline stabilization would still take place on the west side of the Cove Inlet and north shore where the reservoir is immediately adjacent to the site to minimize the deterioration that is occurring there (Figure 11). The No Action Alternative would not address the condition of the existing vegetation at the site, which has been heavily impacted by overuse of the site (Figure 12).

Figure 5 No Action Alternative. West Side of Cove Inlet.

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Figure 6. No Action Alternative. East Side of Cove Inlet.



Figure 7. Site Overview. Overview of Cove Recreation Site from the east side (May 2002).



Figure 8. Site Condition. View of day use structures and the surrounding environment along Cove Inlet from the southeast side (January 2002).



Figure 9. Close-up of Existing Structure. Existing day use structure at Cove Recreation Site (May 2002).



Figure 10. Existing Structures. Existing day use structures at Cove Recreation Site (January 2002).



Figure 11. North Shore. Existing conditions along the north shore of Cove Recreation Site (January 2002).



Figure 12. Site Vegetation. Vegetation on the west side of Cove Inlet at Cove Recreation Site (May 2002).

There are three older brick and wood construction vault toilets on the site designed for separate male and female use. The toilets remain functional and have generally been well maintained, though they do not vent odors with nearly the efficiency of a modern sweet-smelling toilet (SST) design, nor do they meet current accessibility standards.

The site has a centrally developed functional water system consisting of a well, pump and pump house, and 4,100 feet (1,250 m) of pipeline. There are seven spigots distributed throughout the site. The water system is tested regularly to ensure potable water is available for users. The output of the well suggests that it can sustain considerably higher use than it now receives.

Intermediate Action Alternative

The Intermediate Action Alternative is a compromise between the Proposed Action Alternative and the No Action Alternative. It would represent an improvement from the existing situation but would not include the same degree of expansion of the Cove Recreation Site as described in the Proposed Action Alternative.

The 25 existing facilities, as described in the No Action Alternative, would be reconstructed/rehabilitated and would allow for overnight use. As described under the Proposed Action Alternative, the site would be upgraded to be handicapped accessible and would include strategically located water spigots and single unit vault restrooms. Other than the addition of the dual campground host unit, no new expansion would take place. The new campground host unit would be developed with a concrete pad, electric, water, and RV sewer hookup, and a structure for shading and screening from the elements. Vegetative plantings and associated irrigation would be added. The shoreline stabilization improvements would still take place on the west side of the Cove Inlet and north shore where the reservoir is immediately adjacent to the site to minimize the deterioration that is occurring there. Improvements would be made to the existing boat docks in the recreation site. A new fee structure for use of the site would be implemented to allow for maintenance of the upgraded facilities.

Description of the Affected Environment

Unless otherwise noted, information provided in this section is from the Snake River Birds of Prey National Conservation Area Management Plan (BLM 1995).

Overview of the Project Area

The location of the proposed project is Cove Recreation Site, a 160-acre parcel of land located on the south shore of the C.J. Strike Reservoir that offers day use facilities for recreationists. C.J. Strike Reservoir is a 7,500-acre impoundment of the Snake and Bruneau Rivers in southwestern Idaho and lies in a rural setting about 14 and 45 miles (22.5 and 72.4 km) south of the cities of Mountain Home and Boise, Idaho, respectively. The recreation site is situated off of SH-78 in Owyhee County between the towns of Grandview and Bruneau, Idaho. The Cove Recreation Site is located within the boundary of the NCA. The Bruneau Narrows, a steep-walled canyon area that the Bruneau River flows through, are east of the recreation site.

The NCA was established in 1993 for the purpose of providing for the “conservation, protection, and enhancement of raptor populations and habitats” as well as the protection of other resources and values (Public Law 103-64, Section 3). The NCA supports a variety of public uses, including camping, fishing, hunting, and other forms of recreation. Cove Recreation Site is a heavily used area that suffers from many of the same management problems that are common throughout the NCA. Management issues at the NCA include: replacement of native vegetation by exotic plant communities; negative impacts to special status plant and animal species resulting from habitat destruction and human disturbance; threats to significant resources and values of the NCA due to increasing levels of recreation use; damage to cultural and paleontological resources as a result of increased visitor use; BLM’s ability to adequately monitor and manage public use of the NCA limited by lack of staffing and funding; and proper land management compromised by unauthorized use of public lands.

Recreation Resources

The Recreational Setting

Features of C.J. Strike Reservoir and the Cove Inlet that make them particularly inviting recreation spots are:

- **Constant Water Levels:** Because of the reservoir’s non-drawdown design, the water level fluctuates less than 4 feet (1.3 m) year round, making it unique when compared to other large reservoirs in the region. It is particularly popular in late summer due to its reliable access for powerboat or sailboat launches.
- **Diverse and Abundant Sport Fishery:** The reservoir has a unique diversity of both cold and warm water species due to the variable structure of the reservoir. Colder river water running through the relict channels of the Snake and Bruneau Rivers on the upstream end of the reservoir provides ideal trout habitat, while the open areas closer to the dam and in the shallow water coves provide excellent bass and

- panfish habitat due to their warmer temperatures. Anglers have the opportunity to catch largemouth and smallmouth bass, rainbow and redband trout, crappie, bluegill, catfish, and sturgeon.
- Deep Water Cove: The Cove Inlet has the ability to accommodate deep-water boat hulls, but is considered too small for practical development of a launch ramp. All five of the current launch facilities on the reservoir (two of Idaho Department of Fish and Game's (IDFG), one privately operated by Black Sands Resort, one at the Mountain Home Air Force Base's Recreation Park and BLM's) are affected in varying degrees by siltation, which occasionally requires dredging in order to provide sufficient draft for launching larger motorboats and sailboats.

Recreational Facilities

The Cove Recreation Site was developed in 1965 with 25 designated use sites. Most of the developed portions of the site lie along a small inlet known locally as the Cove. Each site has a parking area, shade structure, fire-ring, and table. Facilities and services at the site include a boat ramp, water, and restrooms. Most of the facilities are deteriorated as a result of several factors: infrequent corrective maintenance actions; inadequate budget; and long-term effects of constant sun and wind.

Recreational Use and Current Impacts

Much of the visitor use is land-based, including sightseeing, motorized vehicle use (cars, trucks, jeeps, motorcycles, and all terrain vehicles [ATVs]), hiking, hunting, horseback riding, recreational shooting, mountain biking, picnicking, and camping. Water-based recreation takes place mostly during the summer months and includes floating, canoeing, power boating, and fishing on C.J. Strike Reservoir.

Because of heavy historical use of the site, the ground surface surrounding the structures is disturbed and highly compacted from unrestricted vehicle traffic. ORV use is widespread throughout the area. BLM staff specialists have noted an increasing network of trails throughout the NCA. As a result, erosion is a concern in several heavily used areas, including the Cove Recreation Site, particularly on the east side of the inlet. The potential impacts to vegetation, water quality, and public health as a result of overuse of this site are a concern. Uncontrolled ORV activity damages existing habitats, disturbs wildlife within the area (including raptors) and can adversely impact other recreational uses (BLM 1995).

Soils and Landforms

Erosion at the site resulting from human use and natural factors is currently a major problem. Erosion is occurring to such a degree along the reservoir shoreline that the shoreline nearly reaches the existing road in some areas. There is also a lot of erosion in the area where ORV use is occurring. The dirt roads through the area are steep and highly susceptible to erosion. Unless otherwise noted, information in this section is summarized from a soil survey of the Elmore County area (SCS 1985-86).

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Five soil map units occur within Cove Recreation Site. The soil unit comprising the greatest percent of the Cove Recreation Site is a Hawsley loamy sand and is considered a saline sub-irrigated site (Seronko 2002). The unit is composed of 75% Hawsley soil and similar inclusions and 25% contrasting inclusions. It is found on alluvial terraces, drainageways, and dunes and occurs on the east and west sides of the cove inlet. Major uses on this type of soil include rangeland and irrigated cropland. Excavation can expose soil material that is highly susceptible to wind erosion. This type of map unit is limited as a site for septic tank absorption fields because of the very rapid permeability that causes poor filtration of the effluent and can result in pollution of the water supply. Vegetation characteristic of this soil type includes Greasewood, Basin wildrye, Inland saltgrass, and Bottlebrush squirreltail. Trees planted for windbreaks and environmental purposes that would have an average height of greater than 15 feet (4.6 m) after 20 years include Rocky Mountain juniper, idahybrid poplar, blue spruce, and Scotch pine, with the latter being the fastest growing. The majority of the proposed development at Cove Recreation Site would occur in this map unit.

Loray gravelly fine sandy loam represents the second largest percentage of soil units at Cove Recreation Site. The unit is comprised of 75% Loray soil and similar inclusions and 25% contrasting inclusions. It is found on fan terraces. Major uses for this map unit are also rangeland and irrigated cropland. Loss of the upper layer decreases the potential of the soil to produce forage. The growth of deep-rooted plants is restricted by the depth to extremely gravelly sand. Characteristic vegetation includes Shadscale, Bud sagebrush, Indian ricegrass, Thurber needlegrass, Bottlebrush squirreltail, and Sandberg bluegrass. It is not anticipated that any redevelopment would occur on this soil area.

The Trevino-Garbutt-Weso complex is comprised of 40% Trevino soil and similar inclusions, 20% Garbutt soil and similar inclusions, 20% Weso soil and similar inclusions, and 20% contrasting inclusions. It is found on basalt plains. The major use for this soil type is rangeland; however, forage production is limited by low precipitation. The low available water capacity, low precipitation, and the stones on the surface in some areas limit seeding. The depth to bedrock in some areas limits installation of pipelines and fences and the use of equipment. Loss of the upper layer results in a severe decrease in the potential for the soil to produce forage. Vegetation characteristic of the Trevino soil unit includes Wyoming big sagebrush, Thurber needlegrass, Sandberg bluegrass, Bottlebrush squirreltail, and Rabbitbrush, while the Garbutt and Weso units include Shadscale, Bud sagebrush, Indian ricegrass, Thurber needlegrass, Bottlebrush squirreltail, and Sandberg bluegrass. This type of soil comprises a small percentage of the area on the east side of the Cove Inlet that is currently used by ORVs.

The Typic Torriorthents-Rubble land complex is comprised of 60% Typic Torriorthents and similar inclusions, 20% Rubble land, and 20% contrasting inclusions. It is found on canyon sides. The major land use is rangeland but several factors affect this use including: rock fragments on the surface, hazard of water erosion, hazard of wind erosion, depth to bedrock, depth to consolidated material, slope, low precipitation, and areas of Rubble land. Vegetation characteristic of this soil complex includes Shadscale, Bud sagebrush, Indian ricegrass, Thurber needlegrass, Bottlebrush squirreltail, and

Sandberg bluegrass. Trees planted for windbreaks and environmental purposes that would have an average height of greater than 15 feet (4.6 m) after 20 years include Rocky Mountain juniper, golden willow, idahybrid poplar, Scotch pine, and blue spruce, with the latter being the fastest growing. This type of soil comprises a small percentage of the area on the east side of the Cove Inlet that is currently used by ORVs.

The Dors gravelly fine sandy loam comprises the smallest percentage of the Cove Recreation Site. Composition consists of 75% Dors soil and similar inclusions and 25% contrasting inclusions. It is found on dissected alluvial terraces and fan terraces. Major uses include rangeland and irrigated cropland. Dominant vegetation in potential natural plant communities includes Shadscale, bud sagebrush, Indian ricegrass, Bottlebrush squirreltail, Sandberg bluegrass, and Thurber needlegrass. It is not anticipated that any redevelopment would occur in this area.

The information about plant communities described above represents the potential of what could exist in the area. This potential, however, has been impacted by disturbance from overuse of the area. There are still remnants of the potential types of vegetation even though there has been an increase in annual grasses and forbs as a result of overuse (Seronko 2002). Additional information about the soils in the area is provided in Appendix B.

Aquatic and Riparian Resources

The reservoir area has depths ranging from 14.1 ft to 100.1 ft (4.3 m to 30.5 m) and shoreline depths ranging from 0.98 ft to 15.1 ft (0.3 m to 4.6 m). The reservoir's physical geography provides steep gradient shorelines with large complex substrate cover types. The limited amount of vegetative cover in the reservoir is naturally mitigated by the presence of large and complex substrates. Large cobble and boulders account for 21.4% of the substrate sampled, indicating that large substrate type is the dominant instream cover type available for fish. The dominant riparian zone observed along C.J. Strike Reservoir is comprised of grasses, with a mean riparian height of 4.6 ft (1.4 m) (Idaho Power 1997a).

The Snake River within the NCA is designated as an EPA Water Quality Limited Segment due primarily to sediment from irrigation runoff. The Idaho Water Quality Status Report and Nonpoint Source Assessment listed the Snake River from C.J. Strike Reservoir to Swan Falls as not supporting salmonid spawning, and supporting, but at risk, domestic and agricultural water supply, cold and warm water biota, and primary and secondary contact recreation issues (IDHW-DEQ 1989). Sediment from irrigation runoff is the major pollutant in that stretch. Both snails and salmonids require cold, clean water, which is no longer available in quantities required by these animals downstream of C.J. Strike Reservoir.

Riparian vegetation at C.J. Strike Reservoir overall is minimal, and the riparian vegetation at Cove Recreation Site has been heavily impacted by overuse of the site and is also affected by shoreline erosion.

Upland Vegetation

Overall, vegetation at Cove Recreation Site has been damaged due to heavy use of the area. The project area and nearby land is in degraded ecological condition, with evidence of past wildfires throughout the area. Formerly, most of the alkaline flats and toeslopes typifying most of the north half of the project area supported greasewood communities. Soils are generally fine-textured. Small areas which are sometimes sandier or contain cobbly soils likely supported salt desert shrub communities and communities with affinity for sandy sites. Shallow rocky soils on top of the basalt rim in the southeast portion of the project area appear to have supported Wyoming sagebrush and/or winterfat communities (Popovich 2002).

Currently the area is dominated by weedy cheatgrass (*Bromus tectorum*) or co-dominated by cheatgrass and *Poa sandbergii* over the entire project area uplands, except for a small north-south strip of less-recently burned salt-desert shrub community bordered by a road to the west and camping areas along the river inlet to the east. This less-recently burned area contains up to 15% shrub cover comprised of *Artemisia tridentata*, *Chrysothamnus*, *Tetradymia glabrata*, *Tetradymia spinosa*, and *Atriplex canescens*. *Distichlis spicata*, *Sitanion hystrix*, *Poa sandbergii* and low amounts (up to 10% cover) of *Sarcobatus vermiculatus* are found in the greasewood flats. *Poa sandbergii*, traces of *Artemisia tridentata wyomingensis*, *Kochia* sp., and traces of *Eurotia lanata* are present in the area above the rim. Areas with sandy or cobbly soils contain a strong presence of *Stipa comata* and *Poa sandbergii*, with lesser amounts of *Oryzopsis hymenoides*, *Sitanion hystrix*, and *Atriplex canescens*. Shrub cover in areas other than greasewood flats and the small shrub strip is less than one percent. The riparian area is weedy and dominated by common species of *Carex*, *Juncus*, *Scirpus*, *Salix*, *Solidago*, *Phalaris arundinacea*, and *Elaeagnus angustifolia* (Popovich 2002).

No noxious weeds were observed during a survey of the project area. Some weedy species were observed including *Halogeton glomeratus*, *Sisymbrium altissimum*, *Polygonum*, *Salsola*, *Lepidium perfoliatum*, *Phalaris*, *Xanthium*, *Iva*, and several plants of *Tamarix parviflora* (Popovich 2002).

BLM manages for species of special concern in addition to threatened and endangered species listed under the Endangered Species Act (ESA). While twelve special status plant species are known to occur in the NCA (DeBolt 2002), no sensitive plant species were previously known to occur at Cove Recreation Site. A special status plant inventory was conducted for this project and a single plant of *Glyptopleura marginata* was located in a highly-disturbed greasewood flat, and a single plant of *Chaenactis stevioides* was located in a less-disturbed rocky sideslope microsite, both on the east side of Cove Inlet. Suitable areas near the plants were carefully searched but no additional plants were observed. No other rare plants were observed. A subsequent survey is planned to determine if *Teuchrium canadense* var. *occidentale*, a later blooming species, is present (Popovich 2002).

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Glyptopleura marginata is a BLM sensitive species found in Elmore, Owyhee, and Twin Falls counties in Idaho. Habitat consists of dry sandy-gravelly or loose ash soils in shadscale, greasewood, rabbitbrush, spiny hopsage, winterfat, and sagebrush communities, at elevations of 2,952.8-3,937 feet (900-1200 m) (BLM 2001). Within the NCA, habitat consists of dry sandy soils in salt desert shrubs (BLM 1995).

Chaenactis stevioides is a BLM sensitive species. In Idaho it is found in Ada, Elmore, and Owyhee counties. Habitat consists of open, usually sandy sites in salt desert shrub, primarily, Wyoming sagebrush, horsebrush, four-wing saltbrush, and Indian ricegrass communities, to 3,937 feet (1,200 m) elevation (BLM 2001). Within the NCA, habitat was identified as sandy soil in salt desert shrub and Wyoming big sagebrush (BLM 1995)

Lepidium papilliferum was listed by the FWS as a candidate species on October 25, 1999. *Lepidium papilliferum* is an annual or biennial found in sagebrush-steppe habitats between approximately 2,200 feet and 5,300 feet (670–1,615 meters) elevation in southwestern Idaho. The majority of the populations are extremely small and existing habitat is fragmented, making local extirpation a threat to the species. This species grows on small depositional microsites similar to vernal pools (generally known as slickspots, mini-playas, or natric sites) ranging in size from less than 10 square feet to about 110 square feet in diameter within communities dominated by other plants. These microsites are characterized by relatively high sodium and clay concentrations. This species is known to occur within the NCA and habitat there consists of clay lenses in Wyoming big sagebrush (BLM 1995). The project area is not suspected to have suitable habitat for this species (DeBolt 2002).

Teucrium canadense var. *occidentale* is a BLM sensitive species that is found in Ada, Canyon, Idaho, Owyhee, and Washington Counties in Idaho. Habitat consists of streambanks and moist bottom-lands, at 2,624.7-3937 feet (800-1,200 m) elevation (BLM 2001). Habitat for this species within the NCA is characterized as moist, low ground (BLM 1995). It may occur adjacent to Cove Recreation Site (DeBolt 2002).

Suitable habitat exists in the sandy and cobbly areas for *Astragalus purshii ophiogenes* and for *Astragalus mulfordiae* in the areas with strong *Stipa comata* presence. Suitable habitat for *Eriogonum shockleyi* along the rim top and *Blepharidachne* on the toeslopes is very marginal. Suitable habitat for the other rare upland plants exists as very small pockets of microsite breaks totaling less than a few acres (Popovich 2002).

The areas exhibiting a strong presence of *Stipa comata* (total about 10-20 acres) are somewhat noteworthy in the sense that these communities are being lost over time from public land in this area and their retention is desirable. The area could serve as a seed collection site for the species. Similarly, it is desirable to maintain the small salt-desert shrub retention area due to the loss of the shrub component of such communities over time. No other noteworthy communities were observed.

Wildlife Habitat

Twenty-four special status species are found within the NCA. The species of concern identified by the U.S. Fish and Wildlife Service (FWS) and the IDFG Conservation Data Center (CDC) that may occur within the project area include:

- Bald eagle (*Haliaeetus leucocephalus*)
- Gray wolf (*Canis lupus*)
- Mojave black-collared lizard (*Crotaphytus bicinctores*)
- Idaho springsnail (*Pyrgulopsis [Fontelicella] idahoensis*)
- Snake River physa snail (*Physa natricina*)
- Bliss Rapids snail (*Taylorconcha serpenticola*)
- Ferruginous hawks (*Buteo regalis*)
- Woodhouse's toad (*Bufo woodhousii*)
- Yellow-billed cuckoo (*Coccyzus americanus*)

The bald eagle was downlisted to a threatened species on July 12, 1995 (60 FR 35999-36010). They occur in the NCA and are winter visitors to C.J. Strike Reservoir. The reservoir, including a buffer of 0.5 miles (0.93 km) along the body of water, is considered a bald eagle wintering area. Bald eagles gather around reservoirs and rivers in the winter where they can find fish and waterfowl. Bald eagles eat mainly fish during the breeding season; however, they are opportunistic feeders, particularly in the winter, and will eat waterfowl, small mammals, carrion, and fish. Habitat suitability is related to availability of perches, nest trees, security habitat, and amount and type of human activity.

The gray wolf is classified as an experimental nonessential species in the project area (59 FR 60252-60281). In general, gray wolves are found in large tracts of land with a low probability of human encounter (Forest Service 1997). They are not listed as a mammal occurring in the NCA (BLM 1995) and are not anticipated to be found at Cove Recreation Site.

The Mojave black-collared lizard, a BLM sensitive species, is known to occur in the immediate vicinity along the reservoir (Stephens 2002). They are associated with arid habitats where rocks and boulders are present and surrounding vegetation is generally sparse (IMNH 2002). They are uncommon in the NCA (BLM 1995) and are not known to occur at Cove Recreation Site.

The Idaho springsnail was listed as endangered for their entire range on December 14, 1992 (57 FR 59244). At that time, this species had only been found in permanent, flowing waters of the mainstem Snake River. Idaho Power recently conducted surveys as part of their FERC relicensing and found the springsnail extensively above the dam, in the Snake River arm of the reservoir, and in the free-flowing reach below the reservoir (Shinn 2002). They occur on mud or sand associated with gravel to boulder size substratum and are often found attached to vegetation in riffles (Idaho Power 1997b). Due to their habitat requirements they are not anticipated to occur in the water adjacent to Cove Recreation Site.

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The Snake River physa snail was listed as endangered for their entire range on December 14, 1992 (57 FR 59244). This snail occurs on the undersides of gravel to boulder size substratum in swift current in the mainstem Snake River (Idaho Power 1997b). The Snake River physa snail has not been documented in C.J. Strike Reservoir and due to its requirements for cold, clean, flowing water, it is not anticipated to occur in the water adjacent to Cove Recreation Site.

The Bliss Rapids snail was listed as threatened for their entire range on December 14, 1992 (57 FR 59244). This snail is known to occur on stable, cobble-boulder substratum only in flowing waters in the unimpounded reaches of mainstem Snake River and in a few spring alcove habitats in the Hagerman Valley (Idaho Power 1997b). This species requires cold, clean, well-oxygenated flowing water of low turbidity and as such, is not anticipated to occur in the water adjacent to Cove Recreation Site.

The ferruginous hawk is a BLM sensitive species. They are found in shrub-steppe environments at the periphery of pinyon/juniper or other woodlands. They nest in trees, on cliffs, on artificial structures, and on the ground and hunt from perches or the air. Ferruginous hawks nest in the general area of Cove Recreation Site; however, no known nest territories occur at Cove Recreation Site (Stephens 2002).

Woodhouse's toads are restricted to the western portion of Idaho, particularly along the Snake River and its associated drainages. They are typically found in prairie and brushy flats habitats, often associated with a water source. Water sources vary from irrigation ditches, ponds, small lakes, to backwaters of the Snake River (IMNH 2002). They have been captured at C.J. Strike dam and reservoir and may be present at Cove Recreation Site (Stephens 2002).

The yellow-billed cuckoo was designated as a Candidate species in the western U.S. including Idaho (66 FR 38611-38626). This neotropical migrant species is considered an obligate riparian nester that breeds only in streamside forests especially if willow and cottonwood stands are dominant. They prefer mature cottonwood-willow forests and are dependent upon a dense willow understory and cottonwood overstory and are found in open woodlands with thick undergrowth and deciduous riparian woodlands (IMNH 2002). Suitable habitat for this species does not occur at Cove Recreation Site.

Fisheries

There is a popular sport fishery in the reservoir due to the mixed cold and warm water fisheries. Sturgeon, trout, catfish, and bass fishing are popular recreational activities in the area. According to surveys conducted from 1988 through 1990 and 1994 through 1996, smallmouth bass and largescale sucker were the most abundant species collected in C.J. Strike Reservoir. Other game fish included bluegill, largemouth bass, yellow perch, black crappie, and white crappie (Idaho Power 1997a).

Visual Resources

Cove Recreation Site is considered a “roaded natural setting” and lies at the southeast end of C.J. Strike Reservoir. The reservoir is heavily developed along its south and west shores, which affects the visual quality of the area. Steep plateaus that provide a scenic view from the site border the north and northeast shores of the reservoir. Cove Recreation Site is developed with roads crisscrossing vegetated areas between the designated day use areas. Vegetation consists of a mix of grasses, shrubs, and trees. While the recreation site itself is a flat area, the area east of the Cove Inlet has a moderately steep slope leading up to a plateau. A variety of lines, forms, colors, and textures result from the landscape features present.

Four key observation points (KOPs) were selected for assessing the visual resources present at Cove Recreation Site:

- The plateau on the east side of the inlet
- The road coming into the site (from SH-78)
- Black Sands Resort
- The area between North Park and the Mountain Home Air Force Base Recreation Park north of the dam.

Cultural Resources

Numerous prehistoric archaeological sites exist within the NCA and may represent human occupation as far back as 15,000 years ago. The Snake River Canyon within the NCA was densely occupied during prehistoric times and areas within the NCA contain more than 800 recorded sites. Within the NCA, the Guffey Butte/Black Butte Archaeological District contains more than 200 recorded sites and was placed on the National Register of Historic Places in 1978. It is likely that additional undiscovered sites occur within the NCA.

Abundant evidence of historical human presence also occurs within the NCA and several locations are either listed or eligible for listing on the National Register of Historic Places. Oregon Trail ruts are still visible in parts of the NCA (Figure 13). The “Strike Ruts” are evident just southeast of C.J. Strike Reservoir, although they are badly eroded in places (Franzwa 1990, p. 224).

Cultural resources within the NCA have been adversely impacted over the years. Damage, in the form of vandalism, theft, erosion, and ignorance, is occurring to these resources. Sites have been damaged by surface collection and excavation of artifacts and repeated vandalism of rock art sites. Uncontrolled vehicle use has directly damaged some sites resulting in initiation of erosional processes and continued degradation.

Sites have been recorded in the project area previously and a Class III cultural resource survey was conducted as part of this EA. There are three previously recorded sites and one previously recorded isolated find within the project area. Two historic sites were

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recorded during the current survey; a historic dump and the historic Oregon Trail. These two historic sites may be able to provide additional information about the history of the region due to subsurface deposition observed during investigation.

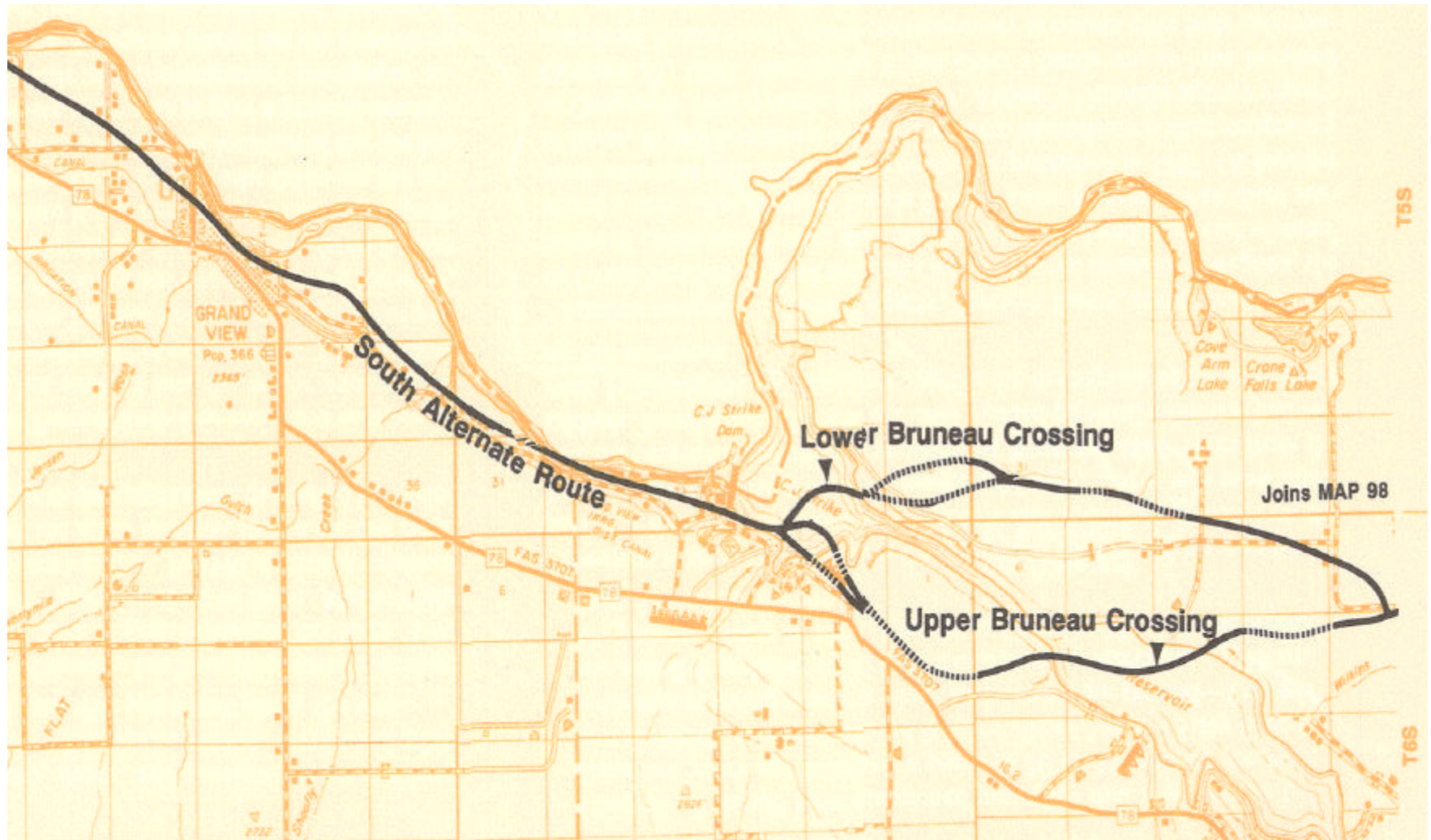


Figure 13. Historic Oregon Trail Routes in the C.J. Strike Reservoir Area.

Map adapted from Franzwa, 1990.

Environmental Consequences

Overview of Anticipated Impacts

Impacts would occur in stages related to the phases in which the project is anticipated to occur. Overall, the impacts to the area would be positive, improving the existing environmental condition of the area and controlling use to prevent further deterioration in the future. Under each resource for the Proposed Action, BLM or other guidance is provided to document goals and objectives of management for that resource.

Proposed Action Alternative

Impacts to Recreation Resources

The Bruneau Resource Management Plan (RMP) states that an objective for recreation is to provide high-quality, varied recreation opportunities commensurate with public demand. Facilities are to be developed as needed to control visitors, protect resources, and accommodate public use (BLM 1983, 1990 Update).

Under the Proposed Action, the site would be redeveloped and managed to sustain a high level of year-round use by a variety of recreationists participating in fishing, boating, camping, day hiking, sight-seeing, and other activities. The redeveloped site would provide opportunities for both day use and multi-day use. Expanded facilities would meet the demands of a significantly larger population than was present when the site was originally designed.

The addition of a camp host unit would signal a different management approach that would ultimately result in a better recreational experience (Phase I). The addition of full service hookups would help to attract and retain volunteer campground hosts. The host site would be designed to provide visual control over access into the recreation area. Control provided by an onsite host would help reduce impacts related to unrestricted vehicle traffic. The addition of the site host would also reduce expenses related to vandalism.

Recreational experiences for the public would be enhanced by the development of facilities that provide safe access to the reservoir for a variety of users (Phases I and II). Where possible, day use areas would be hardened for full accessibility for handicapped users and fishing docks would be added that are also fully accessible. Updated facilities would help minimize health and safety concerns through improved sanitary waste disposal (Phases I, II, and III).

As use of the area has increased, so has the need for a comprehensive visitor information program (BLM 1995). Development of three major Interpretative/Informational Kiosks would enhance the recreational experience for visitors (Phases I and II). The legislation establishing the NCA directs the BLM to provide public educational and interpretive opportunities about the wildlife and other resource values at the NCA. Development of

an interpretive kiosk for the Oregon National Historic Trail was recommended in previous planning (BLM 1983, 1990 Update) and would be implemented as part of the Proposed Action.

Implementation of a fee structure at Cove Recreation Site would help fund maintenance and other costs to ensure safe access and use and is not anticipated to negatively impact the recreational experience or prohibit use (Phase I). Use of the site has the potential to positively affect the economic growth and stability of the surrounding rural area, particularly the towns of Grandview and Bruneau, through the creation of additional local demand for retail goods and services.

Impacts to Soils and Landforms

The Bruneau RMP states that soil stability benefits a variety of land uses and soil erosion should be minimized and good perennial vegetation cover should be maintained or established (BLM 1983, 1998 Update). It is recommended that perennial vegetation be maintained where it exists and established where feasible/economical to stabilize soils and improve habitat (BLM 1983).

Under the Proposed Action, access and facilities would be updated and expanded for a variety of activities in a way that protects the surrounding environment. The addition of a camp host would ensure use is restricted to designated areas. Designating areas for use would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are currently used even though they are outside the existing authorized use areas (Phase I). Vegetative plantings would also stabilize soil and reduce erosion in areas (Phases I and II). Shoreline stabilization would also reduce erosion in the long run and enhance vegetative growth (Phase I). During the construction phase, where updated facilities would be installed and changes would be made on the north shore, ground disturbance would occur. This could cause a temporary increase in soil erosion until the ground could be stabilized and vegetative plantings could become established (Phases I, II, and III). Designing sites to minimize erosion and planting vegetation that would stabilize soils would mitigate expansion of facilities into new areas (Phases I, II, and III).

The Proposed Action would include rehabilitation/recontouring of the area to minimize erosion. As a result, a substantial reduction in erosion is anticipated. Modifications to the access and interior road system would provide for effective vehicular management within the recreation site. Management of vehicular use and conversion of routes from general vehicular travel to foot traffic would reduce negative impacts to soils and landforms and decrease erosion (Phase II). Changes to the trail network would also help to reduce erosion at the site (Phases I, II, and III). The redirection of ORV use from the site entrance to other existing routes providing access to the Narrows would reduce erosion in the areas no longer being used. Rehabilitation to a natural condition of several of the ORV-created trail segments on the east side of Cove Inlet (to the Narrows) and reconstruction of other segments for non-motorized use would also stabilize soils and reduce erosion.

Development of vegetative screening around the camp units would help to stabilize soils and reduce erosion (Phases I and II). Designating areas for use and increasing the number of sites available would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are currently used even though they are outside the existing authorized use areas (Phases I and II).

Impacts to Aquatic and Riparian Resources

The NCA Management Plan recommends management for riparian areas that includes improvements through the planting of native species and reseeded of disturbed areas to establish a shrub and perennial grass component to provide high quality wildlife habitat (BLM 1995).

Improvements to access and facilities as part of the Proposed Action would help to minimize resource impacts by controlling vehicle access. Reductions in erosion would ultimately result in improvements to water quality adjacent to the site and stabilized soil would provide better habitat for riparian plants (Phases I, II, and III). Designating areas for use and increasing the number of sites available would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are currently used that are outside the existing use areas, reducing sediment input to the reservoir (Phases I, II, and III). Shoreline stabilization would help establishment of riparian vegetation by reducing erosion (Phase I).

Where changes to the trail network would occur adjacent to the reservoir, erosion and subsequent sediment input would be reduced (Phases I, and II, and III). Hardening of the shoreline trail along the Cove Inlet area, hardening of the existing soil base road along the shoreline for use as a trail, rehabilitation to a natural condition of several of the ORV-created trail segments on the east side of Cove Inlet and reconstruction of other segments for non-motorized use would also stabilize soils and reduce erosion. Sediment input to the reservoir would be decreased thereby improving water quality.

Management of vehicular use would reduce erosion and improve water quality (Phase I). Modifications to the access and interior road system would provide for effective vehicular management within the recreation site. Redirection of ORV use at the entrance to other existing routes and conversion of routes from general vehicular travel to foot traffic would reduce erosion and subsequent sediment input to the reservoir.

During the construction phase, where updated facilities would be installed and shoreline stabilization efforts would take place, ground disturbance would occur (Phases I, II, and III). This would cause a temporary increase in soil erosion until the ground could be stabilized and vegetative plantings could become established. A temporary increase in sediment input to the reservoir would be possible, potentially affecting water quality. Development of vegetative screening around the camp units would help to stabilize soils and reduce erosion (Phases I and II).

The RV sewer hookup for the host camp site, the RV dump station, and the updated restrooms would be designed and/or located away from the riparian zones to minimize impacts to water quality. The RV sewer hookup for the host camp site would either be connected to a fully contained septic vault that would require regular pumping or to a septic drain system. Wastes from the RV dump station would be handled to ensure that no impacts occur to water quality. The restrooms would use fully contained septic vaults to ensure that no adverse impacts occur to water quality adjacent to the site (Phases I and II).

Impacts to Upland Vegetation

BLM is responsible for the protection of rare/endangered/sensitive plants (BLM 1983). For known special status plant sites, the NCA Management Plan recommends protection of the sites (BLM 1995). It is recommended that perennial vegetation be maintained where it exists and established where feasible/economical to stabilize soils and improve habitat (BLM 1983). Protection of remaining native shrub habitat and restoration of native plant communities is also recognized as important (BLM 1995, p. 48).

Under the Proposed Action, access and facilities would be provided for in a way that protects the surrounding environment, reducing impacts to vegetation by controlling vehicle access and establishing user areas among other actions. Designated camping sites with fire pits should help minimize the fire threat from the cheatgrass in the area.

Changes to the trail network would help to stabilize soils and reduce erosion, improving the probability of vegetation becoming established (Phases I, II, and III). Rehabilitation of several of the ORV-created trail segments to a natural condition and reconstruction of other segments for non-motorized use would also allow for stabilization of soils and vegetative growth. The redirection of ORV use from the site entrance to other existing routes providing access to the Narrows would reduce damage to existing vegetation and improve the likelihood of establishing new vegetation.

During the construction phase, where updated and new facilities would be installed, ground disturbance would occur (Phases I, II, and III). This would affect existing vegetation in some areas. New roads and camp sites would permanently remove portions of the land that are currently vegetated. Development of vegetative screening around the camp units would mitigate this to some extent and would help to stabilize soils (Phases I and II). Designating areas for use and increasing the number of sites available would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are used now that are outside the existing use areas (Phases I, II, and III). Establishment of barriers in areas such as the boat ramp and adjacent shoreline where boats would be beached would restrict use in areas with sensitive vegetation. Appropriate thematic interpretative information and rules and regulations provided at the kiosks would help reduce negative impacts to existing vegetation.

Under the Proposed Action, the occupied rare plant sites and extant plants would likely be destroyed or adversely impacted over time from direct physical disturbance. Weedy plants may invade the area to an increased degree. Nonetheless, no mitigation measures are recommended. The area is already so highly disturbed that its protection is not warranted, and the low numbers of rare plants observed here renders this site of low overall conservation value for these species. The possible loss of these species from this site is not anticipated to be consequential to the long-term viability of the species across their ranges. The locations of the observed *Chaenactis* and *Glyptopleura* would be marked before work occurs on the east side of the inlet and avoided if possible.

The Proposed Action would be anticipated to adversely impact or destroy the plants and areas of good *Stipa* retention through construction and expansion of visitor use facilities. Indirect disturbance such as potential increased wildfire associated with construction activities or increased visitor use would not be anticipated to adversely affect the *Stipa* plants or long-term survival. However, it would adversely affect the shrub component of the remaining salt-desert shrub strip.

If *Teuchrium* is found in subsequent surveys, adverse impacts could occur to the species if it is present in the area where shoreline stabilization efforts would occur.

Impacts to Wildlife Habitat

It is recommended that BLM take actions to enhance the affected habitats or populations of special status wildlife species where habitats or populations are declining or are in unsatisfactory condition (BLM 1995).

The Proposed Action is anticipated to indirectly improve habitat for wildlife species. Native shrub and riparian habitat improvements, such as planting of tree and native shrub species should improve habitat by providing food and cover for many species (Phases I and II). Improvements made for shoreline stabilization would also improve riparian habitat for some species by enhancing growth of riparian vegetation (Phase I). Concentrating use in specific areas would also facilitate habitat recovery in areas where human use would be restricted (Doremus 2002). Habitat is not ideal in the camp areas for most species, due to the amount of use and soil compaction. The amount of use would not be reduced by the Proposed Action, and in fact may be increased, but use would occur in designated areas, thereby allowing other areas to improve and provide better habitat. Rehabilitation of the area currently used by ORVs would improve wildlife habitat on the east side of the Cove Inlet (Phases II and III).

There is currently minimal suitable habitat at Cove Recreation Site for bald eagles. Human disturbance and the lack of perch sites affect the population of wintering bald eagles. Planting trees around the camp units for shade and cover would increase available perch sites for wintering bald eagles (Phase II).

Responses of eagles to human activity vary depending on type, intensity, duration, timing, predictability, and location of human activity. Bald eagles react to the proximity

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of humans by modifying activity and movements to avoid encounters. As long as humans are present, short-term displacement is probable. They appear to avoid construction and reclamation work; however, eagles are not usually present during the non-winter months and therefore would only potentially be affected by construction during the winter (Forest Service 1997). Bald eagles are not anticipated to be adversely affected by the Proposed Action.

The Idaho springsnail, Snake River physa snail, and Bliss Rapids snail all require cold, clean, well-oxygenated flowing water of low turbidity. The Idaho springsnail has been found in the reservoir but it is not anticipated to occur in the Cove Inlet area. The Snake River physa snail and Bliss Rapids snail have not been documented in C.J. Strike Reservoir and due to their habitat requirements, are not anticipated to occur in the Cove Inlet area.

The Mojave black-collared lizard is uncommon in the NCA but is known to occur in the immediate vicinity along the reservoir (BLM 1995). They are mobile and should be able to avoid impacts from construction by temporarily relocating from the area. If present in the project area, they are not likely to be adversely affected by the Proposed Action.

Ferruginous hawks nest in the general area, however no known nest territories occur at Cove Recreation Site (Stephens 2002). They should not be impacted by the Proposed Action.

Woodhouse's toads have been captured at the dam and reservoir but are not known to occur in the project area (Stephens 2002). Similar to the Mojave black-collared lizard, this species is mobile and if present in the area, should be able to temporarily relocate to avoid any impacts during the construction phase of the Proposed Action.

Suitable habitat for Yellow-billed cuckoo does not occur in the project area. They are not anticipated to be impacted by the Proposed Action.

Development of three major Interpretative/Informational Kiosks could provide important information about wildlife habitat at Cove Recreation Site. Appropriate information and rules and regulations would help reduce negative impacts to existing habitat (Phase I). Information could be provided about threatened and endangered and sensitive animals in the area to ensure their proper identification and protection.

Impacts to Fisheries

BLM does not actively manage fishery resources in C.J. Strike Reservoir. However, they are responsible for related activities. For example, the Bruneau RMP recognizes that riparian habitat improvements would enhance fishery production and water quality (BLM 1983).

Elements of the Proposed Action that go hand-in-hand with recreation, such as planting trees along the shoreline and in the day-use and camping areas, would improve fishery

habitat (Moody 2002). Development of vegetative screening around the camp units would create shading and help to stabilize soils, thereby decreasing erosion (Phases I and II). Designating areas for use and increasing the number of sites available would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are currently used even though they are outside the existing use areas (Phases I, II, and III). Where soils are stabilized and vegetation is established, erosion would be reduced resulting in decreased sediment input to the reservoir, thereby potentially improving fisheries habitat.

Erosion would be temporarily increased as a result of ground disturbance during construction, particularly during the shoreline stabilization efforts (Phases I, II, and III). This may result in an increase in sediment input to the reservoir, potentially affecting fishery habitat. These impacts would be temporary. Shoreline stabilization efforts and recontouring of the site would stabilize the soils and reduce erosion (Phases I and II). As part of the stabilization, new habitat could be created, particularly in the area where riprap would be installed (Doremus 2002).

Modifications to the access and interior road system would provide for effective vehicular management within the recreation site. Management of vehicular use and conversion of routes from general vehicular travel to foot traffic would reduce erosion (Phase I). Reductions in erosion would result in reduced sediment input to the reservoir with the potential to improve water quality and fishery habitat. Where changes to the trail network would occur adjacent to the reservoir, sedimentation would be reduced as erosion is reduced thereby improving water quality (Phases I, II, and III). Any improvements to water quality would have the potential to improve fishery habitat.

Leaching from old or inadequate sanitary facilities could lead to water quality impairments that could ultimately impact local fisheries (Moody 2002). The RV sewer hookup for the host camp site, the RV dump station, and the updated restrooms would be designed and/or located away from riparian zones to minimize impacts to surrounding resources (Phase I and II). Appropriate actions with regard to waste facilities would be taken to ensure that water quality and fisheries are not affected.

Impacts to Visual Resources

BLM is required to manage lands in such a manner to protect and maintain the existing visual qualities, provide for enhancement where consistent with management policies, and rehabilitate lands which presently do not meet the visual quality standards of surrounding lands (BLM 1983). Management direction states, "All new developments on public lands within the NCA would be subordinate to the existing landscape character and would be located, designed, and constructed in a manner to maintain or improve existing VRM classes. Existing facility designs would be improved to reduce the visual impacts as maintenance or reconstruction allow" (BLM 1995, p. 113).

The reconstruction project would have minimal impact on the visual quality when viewed from the KOPs at Black Sands Resort and at the recreation sites near the dam (from

which the Cove Recreation Site is barely visible). Trees along the shoreline block most of the view of the structures from both of these KOPs, and while new structures would be added as part of the Proposed Action, new vegetation would also be planted that would buffer the view. The most apparent feature from the dam area and Black Sands Resort is that of the ORV-created trails on the east side of the Cove Inlet. The trails provide a bold contrast to the surrounding features. Changes to the area affected by ORV use may help minimize this contrast by closing and rehabilitating some areas. The shoreline stabilization may potentially be visible from these KOPs. Any impacts would be temporary during the construction. Construction of the beach area would potentially be visible and may create a visible contrast.

The changes in visual quality would be most apparent from the KOPs located on the east side plateau and the road coming into the site. Removal of the existing deteriorating structures and replacement with more modern designs would reduce the visual impacts of the site. Additional roads and trails added as part of the Proposed Action Alternative would potentially impact the visual resources. Additional structures and facilities would be visible from both locations. The addition of camp sites, facilities, kiosks, and other structures would impact the visual resources. They would be designed such that colors and forms would blend in with the natural setting to minimize impacts.

Several aspects of the Proposed Action would help to stabilize soils and reduce erosion. Where soils are stabilized, vegetation would be more likely to become established thereby enhancing the visual aesthetic of the site. Changes to the trail network and development of vegetative screening around the camp units would help to stabilize soils (Phases I, II, and III). Designating areas for use and increasing the number of sites available would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are currently used that are outside the existing approved use areas (Phases I, II, and III). These changes would all improve the visual resources.

Impacts to Cultural Resources

Responsible Federal agencies are required to take an active role in preservation and protection of cultural sites from human as well as natural sources of deterioration. According to the Bruneau RMP, any remnants of the Oregon Trail should be preserved for public use with a 0.25-mile (0.40-km) corridor on each side and an interpretive site should be developed near Cove Recreation Site (BLM 1983).

Potential impacts would include increased possibility of looting of visible cultural resources and vandalism to the known cultural properties. Potential threats to the integrity of the cultural properties would be due to the visibility of the cultural material by foot and ATV use within the area. ORV use within the area may also threaten any buried cultural resources.

The following mitigations would ensure potential impacts from the Proposed Action are minimized:

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Ground disturbing activities must be confined to the surveyed area

- 1.) In the event that cultural resources are encountered during ground disturbing activities, all work within a 100-ft (30-m) radius would be stopped immediately until appropriate personnel from the BLM and State Historic Preservation Office (SHPO) can be contacted
- 2.) All construction and maintenance personnel would be notified concerning the confidentiality of site location information and that the collection of cultural materials is prohibited, and
- 3.) The historic dump and historic Oregon Trail sites should be avoided.

The Proposed Action would involve soil disturbance for activities such as road contouring and reconstruction and installation of camping and day use facilities that may impact cultural resources (Phases I, II, and III). However, hardening of trails and re-routing ORV use to specific areas would reduce the likelihood of further damage to resources in the area (Phases I, II, and III).

Development of three major Interpretative/Informational Kiosks could provide appropriate thematic interpretative information and rules and regulations that could help reduce negative impacts to cultural resources in the area (Phase I). Information could be provided about cultural resources in the area to ensure their protection.

Intermediate Action Alternative

Impacts to Recreation Resources

This alternative would partially address the project need in that facilities would be updated to allow for overnight use. Overnight and multi-day use is currently occurring even though present facilities are not designed for that type of use. Updated facilities, including new restrooms, would allow for safe use of the area by the public. Fees would be charged for use of the site, which would also help with maintenance and other costs to ensure safe access and use for recreationists. The addition of full service hookups would help to attract and retain volunteer campground hosts. The presence of the camp host would reduce vandalism and increase the longevity of the new facilities, by providing visual control over access into the recreation complex. Oversight allowed by the addition of the camp host would also ensure recreationists are only using designated areas. Under the Intermediate Action Alternative, facilities would not be expanded to include additional areas and therefore would not meet the demand of increased use of the area resulting from an increased population.

Impacts to Soils and Landforms

Under the Intermediate Action Alternative, facilities would be updated and an on-site camp host would be added to help minimize or eliminate resource impacts due to uncontrolled use. The addition of a camp host would ensure use is restricted to designated areas. Designating areas for use would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas

that are used now even though they are outside the existing authorized use areas. Vegetative plantings would also stabilize soil and reduce erosion in areas. Stabilization of the shoreline would temporarily increase erosion but in the long run would reduce erosion and enhance vegetative growth.

The RV sewer hookup for the host camp site, the RV dump station, and the updated restrooms would be located away from riparian zones and/or designed to minimize impacts to surrounding resources.

During the construction phase, ground disturbance would occur where updated facilities would be installed. This would cause a temporary increase in soil erosion until the ground could be stabilized and vegetative plantings could take place. This alternative would not address the issue of ORV use and the related erosion that is occurring on the east side of Cove Inlet.

Impacts to Aquatic and Riparian Resources

As part of this alternative, access and facilities would be provided for in a way that protects the surrounding environment. During the construction phase, ground disturbance would occur where updated facilities would be installed and where shoreline stabilization would occur. This would cause a temporary increase in soil erosion until the ground could be stabilized and vegetative plantings could take place. The temporary increase in erosion could lead to increased sedimentation to the reservoir.

Improvements would help to minimize resource impacts by controlling vehicle access. Designating areas for use would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are currently used even though they are outside the existing use areas, reducing sediment input to the reservoir. Reductions in erosion would ultimately result in improvements to water quality adjacent to the site and stabilized soil would provide better habitat for riparian plants. Development of vegetative screening around the camp units would help to stabilize soils and reduce erosion. Shoreline stabilization would help establishment of riparian vegetation and would potentially improve habitat for aquatic resources (Doremus 2002).

The RV sewer hookup for the host camp site would be located away from the riparian zone and would either be connected to a fully contained septic vault that would require regular pumping or to a septic drain system. The restrooms would be designed to ensure that no adverse impacts occur to water quality adjacent to the site.

Impacts to Upland Vegetation

Under the Intermediate Action Alternative, access and facilities within the camp area would be provided for in a way that protects the surrounding environment, minimizing impacts to vegetation by controlling vehicle access and establishing user areas among other things. Designated camping sites with fire pits should help minimize the threat of

fire from the cheat grass in the area. During the construction phase, ground disturbance would occur where updated facilities would be installed. This would affect existing vegetation. New roads and camp sites would permanently remove some vegetation from areas that currently have vegetation. Development of vegetative screening around the camp units would help to stabilize soils and enhance regrowth of vegetation. Designating areas for use would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are currently used that are outside the existing approved use areas.

This alternative does not address the area on the east side of the Cove Inlet that is currently being impacted by ORV use and therefore adverse impacts that are occurring to vegetation as a result of that activity would continue. The *Glyptopleura* and *Chaenactis* that are present in the area would potentially be destroyed or adversely impacted by continued ORV use.

Areas subjected to ORV use would likely experience increased soil erosion and adverse impacts to remaining desirable native plant components. Weedy plants may invade the area to an increased degree. Nonetheless, no mitigation measures are recommended. The area is already so highly disturbed that its protection is not warranted, and the low numbers of rare plants observed here renders this site of low overall conservation value for these species. The possible loss of these species from this site is not anticipated to be consequential to the long-term viability of the species across their ranges.

The Intermediate Action Alternative would be anticipated to adversely impact or destroy the plants and areas of good *Stipa* retention through construction of visitor use facilities. Indirect disturbance such as potential increased wildfire associated with construction activities or increased visitor use would not be anticipated to adversely affect the *Stipa* plants or long-term survival. However, it would adversely affect the shrub component of the remaining salt-desert shrub strip.

If *Teuchrium* is found in subsequent surveys, adverse impacts could occur to the species if it is present in the area where shoreline stabilization efforts would occur.

Impacts to Wildlife Habitat

Native shrub and riparian habitat improvements as part of the Intermediate Action Alternative such as planting of tree and native shrub species would indirectly improve habitat by providing food and cover for many species. Shoreline stabilization would improve habitat for some species by enhancing growth of riparian vegetation. Habitat is not ideal in the camp areas for most species due to the amount of use. Concentrating use in specific areas would facilitate habitat recovery in areas where human use is restricted (Doremus 2002). The amount of use would not be changed by the Intermediate Action Alternative but use would be restricted to certain areas, thereby allowing other areas to improve.

Human disturbance and the lack of perch sites affect the population of wintering bald eagles within the C.J. Strike area. There is currently minimal suitable habitat at the Cove Recreation Site. Plantings of trees around the camp units for shade and cover would increase available perch sites for wintering bald eagles and may increase suitable habitat. Bald eagles react to the proximity of humans by modifying activity and movements to avoid encounters. As long as humans are present, short-term displacement is probable (Forest Service 1997). Bald eagles are not anticipated to be adversely affected by the Intermediate Action Alternative.

The Idaho springsnail, Snake River physa snail, and Bliss Rapids snail all require cold, clean, well-oxygenated flowing water of low turbidity. Idaho springsnail has been found in the reservoir but it is not anticipated to occur in the Cove Inlet. The Snake River physa snail and the Bliss Rapids snail have not been documented in C.J. Strike Reservoir and due to their requirements for cold, clean, flowing water, are not anticipated to occur in the Cove Inlet. Shoreline stabilization efforts in the project area may impact the snail species if they are present.

The Mojave black-collared lizard is uncommon in the NCA but is known to occur in the immediate vicinity along the reservoir (BLM 1995). If present in the project area, they should be able to avoid any impacts by temporarily relocating away from the area.

Ferruginous hawks nest in the general area however no known nest territories occur in the project section (Stephens 2002). They are not anticipated to be impacted by this alternative.

Woodhouse's toads have been captured at C.J. Strike dam and reservoir (Stephens 2002). They are mobile and if present should be able to avoid impacts by temporarily relocating out of the area.

Suitable habitat for yellow-billed cuckoo does not occur in the project area and they are not anticipated to be impacted by this alternative.

Impacts to Fisheries

Elements of the Intermediate Action Alternative that go hand in hand with recreation such as planting trees along the shoreline and in the day-use and camping areas could improve fishery habitat (Moody 2002). Development of vegetative screening around the camp units would create shading and help to stabilize soils thereby decreasing erosion. Designating areas for use would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas currently used that are outside the existing designated use areas. Where vegetation is established and soils are stabilized, erosion would be reduced resulting in decreased sediment input to the reservoir, therein potentially improving fisheries habitat. Erosion may be temporarily increased as a result of ground disturbance during project construction. This may subsequently result in an increase in sediment input to the reservoir, potentially affecting fishery habitat.

Shoreline stabilization and recontouring of the site would temporarily increase erosion but would stabilize the soils and reduce erosion in the long run. New habitat may be created as a result of the shoreline stabilization, particularly where riprap would be placed. Leaching from old or inadequate facilities could lead to water quality impairments that could ultimately impact local fisheries (Moody 2002). Appropriate actions with regard to waste facilities would be taken to ensure that water quality is not affected.

Impacts to Visual Resources

The Intermediate Action Alternative would have minimal impact on the visual quality when viewed from the KOPs at Black Sands Resort and at the recreation facilities near the dam. Trees along the shoreline block most of the view of the structures from both of these KOPs. Structures would be updated as part of this alternative and new vegetation would be planted that would continue to buffer the view. The most apparent features from the dam area and Black Sands Resort are the ORV-created trails on the east side of the inlet. The trails provide a bold contrast to the surrounding features. This impact to visual resources would continue, as no changes would be made to the area used by ORVs under this alternative. The shoreline stabilization may potentially be visible from these KOPs. Any impacts would be temporary during the construction. The proposed beach area would potentially be visible and may impact the visual resources.

The changes in visual quality would be most apparent from the KOPs located on the east side plateau and the road coming into the site. Removal of the existing deteriorating structures and replacement with more modern designs would reduce the visual impacts of the site. New camping structures and facilities would be visible from both locations. The colors and forms of the new structure and facilities would be designed to blend in with the natural setting to minimize impacts.

Aspects of the Intermediate Action Alternative would help to stabilize soils and reduce erosion. Where soils are stabilized, vegetation would be more likely to become established therein reducing the visual impacts of the site. Development of vegetative screening around the camp units would help to stabilize soils. Designating areas for use would reduce the likelihood of damage occurring in sensitive areas and would allow vegetation to become reestablished in areas that are used now that are outside the existing approved use areas. Shoreline stabilization would stop erosion of the north shore and would enhance vegetative growth in the riparian area. These changes would all improve the visual resources.

Impacts to Cultural Resources

The Intermediate Action Alternative would involve soil disturbance for activities such as reconstruction and installation of structures and facilities and shoreline facilities. ORV use on the east side of Cove Inlet would not be addressed by this alternative. Potential threats to the integrity of the cultural properties would be due to the visibility of the

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cultural material by foot and ATV within the area. ORV use within the area may also threaten any buried cultural resources.

The following mitigations would ensure potential impacts from the Proposed Action are minimized:

- 1.) Ground disturbing activities must be confined to the surveyed area
- 2.) In the event that cultural resources are encountered during ground disturbing activities, all work within a 100-ft (30-m) radius would be stopped immediately until appropriate personnel from the BLM and SHPO can be contacted
- 3.) All construction and maintenance personnel would be notified concerning the confidentiality of site location information and that the collection of cultural materials is prohibited, and
- 4.) The historic dump and historic Oregon Trail sites should be avoided.

No Action Alternative

Impacts to Recreation Resources

Most of the existing facilities have deteriorated over the years and under the No Action Alternative they would be continue to be replaced when they are fully deteriorated and unusable. In recent years, the BLM has slowed the deterioration by reconstructing one or two of the sites (shade structures, picnic tables, and fire grills) each year, despite having no appropriated funding to do so. The aging facilities at Cove Recreation Site were designed to accommodate 150 people and are unable to meet the diverse recreational needs of the area's growing population.

Although originally designed as day use picnic areas they are now used as multi-day campsites. Overcrowding and unmet recreational needs appear to be common at the site. When the facilities are full, campers occupy open areas along the reservoir shoreline and undeveloped sagebrush lands surrounding the developed area. The existing toilets do not meet current accessibility standards. These factors are resulting in deterioration of the area's resources and reducing visitor enjoyment of the area.

Impacts to Soils and Landforms

Continued overuse would result in further vegetative degradation and erosion of the site if the No Action Alternative is selected. Shoreline stabilization on the north shore would stabilize soils in that area.

In addition, under the No Action Alternative, no trails would be closed or rehabilitated in the area where ORV use takes place. Thus, use would continue to be uncontrolled and soils and landforms would continue to be adversely impacted.

Impacts to Aquatic and Riparian Resources

Potential impacts to riparian areas and aquatic resources are a concern as a result of overuse of the site. Overuse is likely to continue if the No Action Alternative is selected. Because facilities are presently inadequate to accommodate the extent of use that occurs, impacts are occurring in areas that are not designated for use, resulting in ground disturbance and erosion, which subsequently impacts riparian areas and aquatic resources.

Under the No Action Alternative, shoreline stabilization would still occur along the north shore. This would help improve water quality and would also improve the condition of the riparian vegetation in the long term. Temporary impacts to water quality would result from disturbance related to the shoreline stabilization efforts and construction of the beach area. Ultimately, the riparian area would be improved as a result of the shoreline stabilization.

Impacts to Upland Vegetation

Overuse of the site is currently impacting upland vegetation. Under the No Action Alternative, overuse is likely to continue. Facilities are presently inadequate to meet the needs of the recreationists visiting the site. As a result, recreationists use undesignated, vegetated areas with negative impacts to the vegetation. Unrestricted ORV use is also impacting the site's vegetation. These impacts would continue under the No Action Alternative.

Under the No Action Alternative, the occupied rare plant sites and extant plants would likely be affected by continued ORV use. Areas subjected to ORV use would likely experience increased soil erosion and adverse impacts to remaining desirable native plant components. Weedy plants may invade the area to an increased degree. Nonetheless, no mitigation measures are recommended. The area is already so highly disturbed that its protection is not warranted, and the low numbers of rare plants observed here renders this site of low overall conservation value for these species. The possible loss of these species from this site is not anticipated to be consequential to the long-term viability of the species across their ranges.

The No Action Alternative would not be anticipated to adversely impact or destroy the plants and areas of good *Stipa* retention.

If *Teuchrium* is found in subsequent surveys, adverse impacts could occur to the species if it is present in the area where shoreline stabilization efforts would occur.

Impacts to Wildlife Habitat

Under the No Action Alternative, overuse would continue because of the inadequate facilities. Because use is occurring in areas that are not designated for use, negative impacts have occurred to wildlife habitat. These impacts would continue.

Under this alternative, shoreline stabilization would still occur. This would improve the condition of the riparian vegetation on the north shoreline thereby enhancing habitat for wildlife that are dependent upon this type of habitat. Disturbance would occur during construction causing temporary impacts.

Impacts to Fisheries

Existing overuse of the site may be impacting fisheries as a result of sediment input to the reservoir. Shoreline stabilization and construction of the beach area would temporarily result in a potential increase in sediment input to the reservoir, therein potentially impacting fisheries. In the long-term, as the shoreline is stabilized, existing habitat may be improved and new habitat may be established.

Impacts to Visual Resources

Minimal impacts to the visual quality are expected from the KOPs at Black Sands Resort and near the dam. Trees along the shoreline block most of the view of the structures from both of these KOPs. The most apparent feature from the dam area and Black Sands Resort is that of the ORV-created trails on the east side of Cove Inlet. The trails provide a bold contrast to the surrounding features. This would continue to be the case, as no actions are planned to improve conditions on the east side of the inlet under this alternative. The shoreline stabilization may potentially be visible from these KOPs. Any impacts would be temporary during the construction. The beach area may be visible from these KOPs.

The visual resources from the KOPs located on the east side plateau and the road coming into the site would be unaffected. The color of the existing structures provides the greatest contrast in the current setting. The structures are lighter in color than the surrounding features and are slightly luminous. Their color blends in to some extent with the roads except for their luminescence. From the angle the site is viewed from the road entering the site, the existing structures are prominent against the water and vegetation in the background. Existing deteriorated structures may be adversely impacting the visual resources at the site currently. No changes would occur as a result of the No Action Alternative.

Impacts to Cultural Resources

The No Action Alternative would involve shoreline stabilization. Where this would occur along the north shoreline, soil disturbance would occur and could potentially threaten any buried cultural resources. Overuse of the site would still continue and potential threats to the integrity of the cultural properties would be due to the visibility of the cultural material by foot and ATV use within the area. ORV use within the area may also threaten any buried cultural resources.

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The following mitigations would ensure potential impacts from the Proposed Action are minimized:

- 1.) Ground disturbing activities must be confined to the surveyed area
- 2.) In the event that cultural resources are encountered during ground disturbing activities, all work within a 30m (100-ft) radius would be stopped immediately until appropriate personnel from the BLM and SHPO can be contacted
- 3.) All construction and maintenance personnel would be notified concerning the confidentiality of site location information and that the collection of cultural materials is prohibited and
- 4.) The historic dump and historic Oregon Trail sites should be avoided.

Consultation and Conformance with Other Plans

Conformance with Other Planning Documents

NEPA regulations, specifically Section 1508.28, allow for tiering of documents to eliminate repetitive discussions of the same issues and to focus on the actual decision issues. Information from two documents was used to develop the majority of this Environmental Assessment: “Bruneau Resource Area’s Management Framework Plan,” U.S. Department of the Interior, Bureau of Land Management, 1983 and “Snake River Birds of Prey National Conservation Area Management Plan,” U.S. Department of the Interior, Bureau of Land Management, 1995. The plan to update facilities at Cove Recreation Site is in conformance with management direction from these two documents.

Consultation

The following people were consulted regarding the reconstruction of Cove Recreation Site.

Ann DeBolt	BLM	Botany
John Doremus	BLM	Wildlife
Brian Flatter	IDFG	Fisheries
Alison Beck Haas	FWS	Threatened and Endangered Species
Daylon Dubkowski	BLM	Field Operations
Stan McDonald	BLM	Cultural Resources
Greg Moody	BLM	Fisheries
Larry Ridenhour	BLM	Outdoor Recreation
Paul Seronko	BLM	Soils
Dean Shaw	BLM	Cultural Resources
Diane Shinn	Idaho Power	Invertebrates
George Stephens	IDFG CDC	Threatened, Endangered, and Sensitive Species
John Sullivan	BLM	NCA Management
Allen Tarter	BLM	Vegetation

BLM also consulted the Shoshone-Paiute Tribe through their monthly Wings and Roots meetings.

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Appendix A. Typical Structure Drawings

Appendix B. Additional Soil Characteristics Information

Appendix B. Additional Soil Characteristics Information

Characteristics for soil types in the Cove Recreation Site

Type	Profile	Runoff	Permeability	Available Water Capacity	Potential rooting depth	Hazard of wind erosion	Hazard of water erosion
Hawsley	0-6 in.-pale brown loamy sand 6-60 in.- pale brown sand	Slow	Very rapid	Low	60 in. or more	Severe	Slight
Loray	0-6 in.-light yellowish brown gravelly fine sandy loam 6-13 in.-very pale brown gravelly fine sandy loam 13-60 in.- variegated extremely gravelly sand	Slow or medium	Moderately rapid	Low	60 in. or more	Moderate	Slight or moderate
Trevino-	0-5 in.-pale brown stony loam 5-12 in.-pale brown loam 12-18 in.-very pale brown fine sandy loam 18 in.- fractured bedrock	Slow or medium	Moderate	Low	10 to 20 in.	Moderate	Moderate
Garbutt-	0-5 in.-light brownish gray silt loam 5-60 in.-light gray very fine sandy loam	Slow or medium	Moderate	High	60 in. or more	Moderate	Moderate
Weso	0-5 in.-pale brown loam 5-19 in.- very pale brown loam 19-24 in.-very pale brown find sandy loam with pockets of cemented	Slow or medium	Moderate	High	60 in. or more	Moderate	Moderate

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	material (hardpan)						
Typic Torriorth ents	0-6 in.-light brownish gray stony sandy loam 6-10 in.-light gray very gravelly sandy loam 10-60 in.-light gray extremely gravelly loamy sand	Medium or rapid	Moderately slow to rapid	Low to high	Consolida -ted material or bedrock at a depth of 20 to more than 60 in.	Moderate	Severe
Rubble Land	More than 90% loose surface stones						
Dors	0-5 in.-light brownish gray and pale brown gravelly fine sandy loam 5-26 in.- pinkish gray and very pale brown fine sandy loam 26-60 in.- variegated very gravelly sand	Slow or medium	Moderately rapid in the upper 20 to 40 in.; very rapid below this depth	Low	60 in. or more	Moderate	Moderate